UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/016,882	12/14/2001	Mark E. Day	5759B-000004/US	7738

28997 7590 03/22/2007	EXAMINER
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ART UNIT	PAPER NUMBER
3628	

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	03/22/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

PTOL-90A (Rev. 10/06)

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	Application No.	Applicant(s)
Office Action Summary	10/016,882	DAY, MARK E.
	Examiner	Art Unit	
	Nathan Erb	3628	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE **3** MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☐ Responsive to communication(s) filed on _____ .
2a)☐ This action is **FINAL**.   2b)☒ This action is non-final.
3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-34* is/are pending in the application.
    4a) Of the above claim(s) _____ is/are withdrawn from consideration.
5)☐ Claim(s) _____ is/are allowed.
6)☒ Claim(s) *1-34* is/are rejected.
7)☒ Claim(s) *3,5,7,9,13,18,22,24 and 28* is/are objected to.
8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.
10)☒ The drawing(s) filed on *19 February 2002* is/are: a)☒ accepted or b)☐ objected to by the Examiner.
    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
    a)☐ All   b)☐ Some * c)☐ None of:
    1.☐ Certified copies of the priority documents have been received.
    2.☐ Certified copies of the priority documents have been received in Application No. _____ .
    3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO/SB/08)
    Paper No(s)/Mail Date *20030121*.
4) ☐ Interview Summary (PTO-413)
    Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____ .

DETAILED ACTION

Information Disclosure Statement

1.   The information disclosure statement filed July 2, 2002, fails to comply with 37 CFR

1.98(a)(2), which requires a legible copy of each cited foreign patent document; each non-patent

literature publication or that portion which caused it to be listed; and all other information or that

portion which caused it to be listed. It has been placed in the application file, but the information

referred to therein has not been considered.

2.   The information disclosure statement filed July 2, 2002, fails to comply with 37 CFR

1.98(a)(3) because it does not include a concise explanation of the relevance, as it is presently

understood by the individual designated in 37 CFR 1.56(c) most knowledgeable about the

content of the information, of each patent listed that is not in the English language. It has been

placed in the application file, but the information referred to therein has not been considered.

Claim Objections

3.   Claims 3, 5, 7, 9, 13, 18, 22, 24, and 28 are objected to because of the following

informalities:

    a. In the fifth line of claim 3, please add a comma after the words "home monitoring."

    b. In the first line of claim 5, please insert the word --of-- after the word "step."

    c. Please insert a period at the end of claim 7.

    d. In the second line of claim 9, please replace the word "pilling" with --billing--.

    e. In the first line of claim 13, please replace the word "include" with --includes--.

    f. In the fifth line of claim 18, please add a comma after the words "home monitoring."

    g. Please insert a period at the end of claim 22.

h. In the second line of claim 24, please replace the word "pilling" with --billing--.

i. In the first line of claim 28, please replace the word "include" with --includes--.

Appropriate correction is required.

Claim Rejections - 35 USC § 112

4.   The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

5.   Claims 6, 9, 15, 21, 24, 30, and 34 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

As per **Claim 6**, Claim 6 recites the limitation "the transfer" in the first line of the claim. There is insufficient antecedent basis for this limitation in the claim.

As per **Claim 9**, the claim contains an incorrectly worded Markush group, rendering the claim indefinite. See MPEP § 2173.05(h). Note that replacing the word "or" with the word --and-- on p. 26, line 13, should correct this problem.

As per **Claim 15**, Claim 15 recites the limitation "said payment cycle" in the first line of the claim. There is insufficient antecedent basis for this limitation in the claim.

As per **Claim 21**, Claim 21 recites the limitation "the transfer" in the second line of the claim. There is insufficient antecedent basis for this limitation in the claim.

As per **Claim 24**, the claim contains an incorrectly worded Markush group, rendering the claim indefinite. See MPEP § 2173.05(h). Note that replacing the word "or" with the word -- and-- on p. 28, line 13, should correct this problem.

As per **Claim 30**, Claim 30 recites the limitation "said payment cycle" in the first line of the claim. There is insufficient antecedent basis for this limitation in the claim.

As per **Claim 34**, Claim 34 recites the limitation "said customer interface" in the third line of the claim. There is insufficient antecedent basis for this limitation in the claim.

Claim Rejections - 35 USC § 102

6.   The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

7.   Claims 1-5, 7-11, 13-20, 22-26, 28-30, and 33-34 are rejected under 35 U.S.C. 102(b) as being anticipated by Peddie et al., U.S. Patent No. 4,351,028.

As per **Claims 1 and 16**, Peddie et al. discloses:

- a method (or a communications system) for customers to communicate with and pay a utility for at least one utility service (column 1, lines 23-44; column 1, line 61, through column 2, line 64);

- establishing (or a utility host programmed to store) a customer account with (or for) said

customer, said customer account including a billing method and a payment method (column 1,

lines 23-44; column 1, line 61, through column 2, line 64; utility host would be the remote

central processor; billing method here could be prepayment billing; payment method here could

be credit card charging);

- providing a communication system comprising a utility host, a customer interface, and a

control assembly programmed to control said utility service and communication between said

utility host and said customer interface (column 1, lines 23-44; column 1, line 61, through

column 2, line 64; utility host would be the remote central processor; customer interface here

includes the display and keyboard on the customer side of the system; control assembly here

would be the data processor on the client side of the communication system);

- communicating (or a customer interface to communicate) payment information to and

from said customer using said communication system to complete payment of at least a portion

of a customer balance on said customer account in accordance with said billing method and said

payment method (column 1, lines 23-44; column 1, line 61, through column 2, line 64; customer

interface here includes the display and keyboard on the customer side of the system; billing

method here could be prepayment billing; payment method here could be credit card charging).

As per **Claims 2 and 17**, Peddie et al. further discloses communicating (or wherein said

communication system is programmed to communicate) customer account and utility service

information to and from said customer using said communication system (column 1, lines 23-44;

column 1, line 61, through column 2, line 64; here, customer account and utility service

information is billing capability).

As per **Claims 3 and 18**, Peddie et al. further discloses wherein said customer account

and utility service information comprises billing capability (column 1, lines 23-44; column 1,

line 61, through column 2, line 64).

As per **Claims 4 and 19**, Peddie et al. further discloses wherein said customer account

and utility service information is provided as customized or pre-defined messages to particular

customer accounts (column 1, lines 23-44; column 1, lines 45-60; column 1, line 61, through

column 2, line 64).

As per **Claims 5 and 20**, Peddie et al. further discloses disconnecting and/or

reconnecting (or wherein said control assembly is programmed to disconnect and/or reconnect)

said utility service using said communication system based upon a comparison of said customer

account with said payment information (column 1, lines 23-44; column 1, line 61, through

column 2, line 64).

As per **Claims 7 and 22**, Peddie et al. further discloses providing (or wherein said

communication system is programmed to provide) customer account usage information for said

utility service using said communication system (column 1, lines 23-44; column 1, line 61,

through column 2, line 64).

As per **Claims 8 and 23**, Peddie et al. further discloses wherein said customer account usage information comprises amount remaining (column 1, lines 23-44).

As per **Claims 9 and 24**, Peddie et al. further discloses wherein said billing method comprises prepayment billing (column 1, lines 23-44).

As per **Claims 10 and 25**, Peddie et al. further discloses wherein said payment method comprises credit card charging (column 1, line 61, through column 2, line 64).

As per **Claims 11 and 26**, Peddie et al. further discloses wherein said debt management includes a postpayment mode and a prepayment mode (column 1, lines 10-20; column 1, lines 23-44; column 1, line 61, through column 2, line 64; column 4, lines 22-46).

As per **Claims 13 and 28**, Peddie et al. further discloses wherein said billing method includes at least one rate schedule (column 1, lines 45-60; column 3, line 35, through column 4, line 7).

As per **Claims 14 and 29**, Peddie et al. further discloses wherein said payment information is communicated in accordance with a payment cycle (column 1, lines 23-44; column 1, line 61, through column 2, line 64).

As per **Claims 15 and 30**, Peddie et al. further discloses wherein said payment cycle supports one or more parameters including a disconnect point (column 1, lines 23-44; column 1, line 61, through column 2, line 64).

As per **Claim 33**, Peddie et al. further discloses wherein said control assembly comprises a power switch, control electronics programmed to complete usage calculations and external communications, and a transceiver for communicating with said utility host (Figure 1; column 1, lines 23-44; column 1, line 61, through column 2, line 64; column 3, lines 8-34).

As per **Claim 34**, Peddie et al. further discloses:

- a communication system for customers to remotely communicate with and pay a utility for at least one utility service (column 1, lines 23-44; column 1, line 61, through column 2, line 64);

- a customer control system at a location remote from said utility, said customer interface being programmed to communicate payment information to and from said customer to complete payment of at least a portion of a customer balance on a customer account in accordance with a billing method and a payment method stored at said utility and to control said utility service to said customer (column 1, lines 23-44; column 1, line 61, through column 2, line 64; column 3, line 35, through column 4, line 7; column 4, lines 22-46; billing method here could be prepayment billing; payment method here could be credit card charging; billing method must be stored at the utility because this would be required for the central processor at the utility to determine when payment is sufficiently past-due to justify disconnecting power to the customer;

payment method must be stored at the utility for the utility to be able to determine whether or not

a credit transfer should be allowed by the data processing means).

Claim Rejections - 35 USC § 103

8.   The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in
> section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are
> such that the subject matter as a whole would have been obvious at the time the invention was made to a person
> having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the
> manner in which the invention was made.

9.   Claims 6 and 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Peddie et

al. in view of Thornborough et al., U.S. Patent No. 4,817,131.

As per **Claims 6 and 21**, Peddie et al. fails to discloses managing (or wherein said

communication system is programmed to manage) the transfer of said utility service to a new

customer or between customers using said communication system. Thornborough et al. discloses

managing (or wherein said communication system is programmed to manage) the transfer of said

utility service to a new customer or between customers using said communication system

(column 1, lines 4-20; column 3, lines 7-31; column 3, line 66, through column 4, line 16;

column 4, lines 49-55; column 6, lines 35-53; column 9, lines 41-52; column 32, lines 1-14). It

would have been obvious to one of ordinary skill in the art at the time of applicant's invention to

modify the invention of Peddie et al. such that it manages (or said communication system is

programmed to manage) the transfer of said utility service to a new customer or between

customers using said communication system, as disclosed by Thornborough et al. Motivation is

provided by Thornborough et al. in that sometimes a new customer moves into a location and

will be using the same meter as the previous customer at that location (column 4, lines 49-55;

column 6, lines 35-53; column 9, lines 41-52; column 32, lines 1-14).

10.   Claims 12 and 27 are rejected under 35 U.S.C. 103(a) as being unpatentable over Peddie

et al. in view of Schelberg, Jr. et al., U.S. Patent No. 5,812,643.

As per **Claims 12 and 27**, Peddie et al. fails to disclose using a smart card to store said

payment information (or a smart card reader for reading a smart card storing said payment

information). Schelberg, Jr. et al. discloses using a smart card to store said payment information

(or a smart card reader for reading a smart card storing said payment information) (column 2,

lines 33-43; column 6, lines 24-47; column 7, lines 30-36; column 8, lines 9-14; column 10, line

49, through column 11, line 14). It would have been obvious to one of ordinary skill in the art at

the time of applicant's invention to modify the invention of Peddie et al. such that it uses a smart

card to store said payment information (or it includes a smart card reader for reading a smart card

storing said payment information), as disclosed by Schelberg, Jr. et al. Motivation is provided

by Schelberg, Jr. et al. in that smart cards are a medium that can be used for the transfer of

payment (column 2, lines 33-43; column 6, lines 24-47; column 7, lines 30-36; column 8, lines 9-

14; column 10, line 49, through column 11, line 14).

11.   Claim 31 is rejected under 35 U.S.C. 103(a) as being unpatentable over Peddie et al.

As per **Claim 31**, Peddie et al. further discloses wherein said utility host comprises a

computer performing tasks (column 1, lines 23-44; column 1, line 61, through column 2, line

64). Peddie et al. fails to disclose wherein a computer performs tasks by running application

software. However, that element/limitation was well-known to one of ordinary skill in the art at the time of applicant's invention. It would have been obvious to one of ordinary skill in the art at the time of applicant's invention to modify the invention of Peddie et al. such that a computer performs tasks by running application software, as was well-known to one of ordinary skill in the art at the time of applicant's invention. Motivation is provided in that it was well known to one of ordinary skill in the art at the time of applicant's invention that application software is an effective method of instructing a computer what to do.

12.   Claim 32 is rejected under 35 U.S.C. 103(a) as being unpatentable over Peddie et al. in view of Frew et al., U.S. Patent No. 4,803,632, in further view of Hogan, U.S. Patent No. 5,699,528, in further view of McGregor et al., U.S. Patent No. 5,577,100.

As per **Claim 32**, Peddie et al. further discloses wherein said customer interface comprises a display and a numeric keypad (Figure 1; column 1, line 61, through column 2, line 64; column 3, line 35, through column 4, line 7; column 3, line 35, through column 4, line 7).

Peddie et al. fails to disclose wherein a display is an LCD display. Frew et al. discloses wherein a display is an LCD display (column 4, lines 7-19; column 8, lines 14-36; column 10, lines 30-42; column 10, line 53, through column 11, line 4; column 11, lines 20-40; column 13, line 18, through column 14, line 2). It would have been obvious to one of ordinary skill in the art at the time of applicant's invention to modify the invention of Peddie et al. such that a display is an LCD display, as disclosed by Frew et al. Motivation is provided by Frew et al. in that an LCD display can be effectively used to communicate utility information to a customer (column

4, lines 7-19; column 8, lines 14-36; column 10, lines 30-42; column 10, line 53, through column 11, line 4; column 11, lines 20-40; column 13, line 18, through column 14, line 2).

Peddie et al. and Frew et al. fail to disclose navigation push-buttons. Hogan discloses navigation push-buttons (column 10, line 65, through column 11, line 9). It would have been obvious to one of ordinary skill in the art at the time of applicant's invention to modify the invention of Peddie et al. as modified above in this rejection such that it includes navigation push-buttons, as disclosed by Hogan. Motivation is provided by Hogan in that navigation push-buttons can be used to move between various selections on a display (column 10, line 65, through column 11, line 9).

Peddie et al., Frew et al., and Hogan fail to disclose multi-colored LED's. McGregor et al. discloses multi-colored LED's (column 5, lines 40-55). It would have been obvious to one of ordinary skill in the art at the time of applicant's invention to modify the invention of Peddie et al. as modified above in this rejection such that it includes multi-colored LED's, as disclosed by McGregor et al. Motivation is provided by McGregor et al. in that different colors of LEDs may be used to communicate various different indications (column 5, lines 40-55).

Conclusion

13.   **Examiner's Note:** Examiner has cited particular portions of the references as applied to the claims above for the convenience of the applicant. Although the specified citations are representative of the teachings in the art and are applied to the specific limitations within the individual claim, other passages and figures may apply as well. It is respectfully requested that the applicant, in preparing the responses, fully consider the references in entirety as potentially

teaching all or part of the claimed invention, as well as the context of the passage as taught by the prior art or disclosed by the examiner.
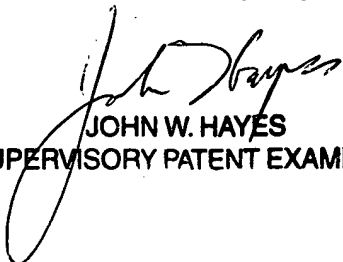
14.   Any inquiry concerning this communication or earlier communications from the examiner should be directed to Nathan Erb whose telephone number is (571) 272-7606. The examiner can normally be reached on Mondays through Fridays, 8:30 AM to 5 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Hayes can be reached on (571) 272-6708. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

<div align="right">
Nathan Erb
Examiner
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JOHN W. HAYES
SUPERVISORY PATENT EXAMINER